A NEW PTEROMALID PARASITE OF THE EASTERN DEATH WATCH BEETLE, *HADROBREGMUS CARINATUS* (SAY)

By George E. Wallace[1]

During the summer of 1956, Mr. David Miller of Terminex Co., Pittsburgh, presented me with some Pteromalidae (Hymenoptera; Chalcidoidea) that he had collected at Titusville, Pa. in a stable which was infested with the Eastern Death Watch Beetle. The specimens proved to belong to the genus *Cerocephala,* and to constitute a new species, the description of which is given below.

With the kind permission of the property owner, Miss Violet Dubar, the site was visited by Mr. Miller and myself in the summer of 1957. One additional specimen of the new species was secured on this visit, and later, still another specimen emerged from a quantity of infested wood that we collected then.

I am indebted to Dr. B. D. Burks and Dr. T. J. Spilman of the Insect Identification and Parasite Introduction Laboratories, U. S. Department of Agriculture; to the former for his helpful comments and obliging courtesy in making comparative examinations; to the latter for identification of the host beetle. Mr. Clifford J. Morrow, Carnegie Museum, kindly executed the illustrations here. Finally I am, of course, much obligated to Miss Dubar, for whom the species has been named, and to Mr. Miller.

Cerocephala dubarae, n. sp.

Female: Length 2.21–2.90 mm. Cheeks and temples very weakly striate. Face with feeble striations converging toward the clypeus. Anterior margin of clypeus with a weak tubercle at each side. Anterior half of pronotum with transverse striations, posterior portion of pronotum, as well as mesonotum, parapsides, axillae, scutellum, and abdomen glassy smooth. Parapsidal furrows, and the suture anteriorly bounding scutellum each constituted as a line of very minute punctures. Propodeum finely and densely punctate, a median carina weakly indicated in some specimens. Dorsal aspect of abdominal petiole longitudinally striate.

Head slightly wider than long. Occipital carina present. Antennal scrobes separated by a prominent carina; two smaller sinuate carinae also present on the face, one located laterad of each antennal insertion, the two slightly converging below toward the clypeus. Except where median carina is produced into an abrupt

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lobe between the antennal insertions, all carinae are smooth in outline—none with spur-like projections (fig. 1). Antennae clavate, gradually increasing in width from first funicle joint to club. First funicular segment about one and one-half times as long as broad, second slightly longer than broad, third quadrate, fourth to sixth slightly broader than long; club conic-ovate, a little longer than the last two funicular segments.

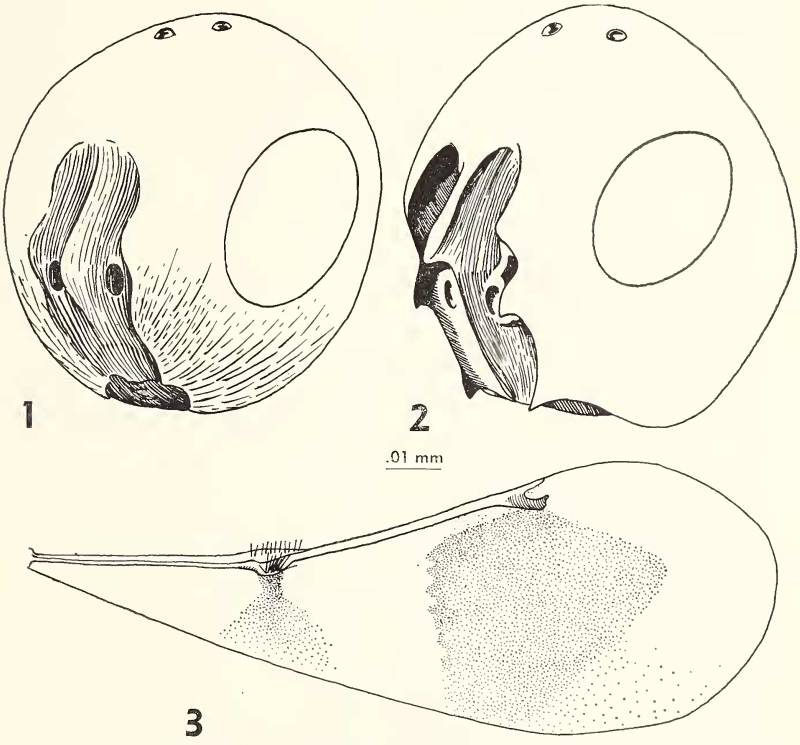

Fig. 1. *Cerocephala dubarae* Wallace, head, semiprofile. Fig. 2. *C. cornigera* Westwood, head, semiprofile (after Gahan). Fig. 3. *C. dubarae,* right forewing.

Forewings having submarginal, marginal, postmarginal, and stigmal veins in ratio of 65:56:6:7. Two dilute brown bands extending across wing (fig. 1); the proximal band arising from the junctural callus of marginal and submarginal veins, and widening posteriorly; apical band somewhat arrowhead-shaped, lying mostly behind the stigmal, and apical third of marginal veins, and extending as a point to about midway to wing apex.

Abdomen, including ovipositor, 1/6 longer than thorax. Ovipositor approximately 1/3 as long as gaster. Abdominal petiole 1/3 the length of hind coxa. First tergite medially encised, comprising 3/8 of gaster; tergite 3 equal to nearly half of tergite 1; tergites 2 and 4–6 shorter, subequal.

Color-shading, individually variable from fulvous to black. In lighter individuals: scapes, head with exception of ocellar and gular areas, prothorax, parapsides, axillae laterally, apical half of first abdominal segment, basal half of ovipositor sheaths, and legs, excepting major portions of fermora and tibiae, fulvous; flagellum and club brown, the latter darker. Abdominal segments 2–6, basal half of first segment, and most of propodeum black or nearly so; antero-lateral angles of the propodeum brown; remainder of thorax brown, but deepening to nearly black along following areas: dorsal sutures, pro- meso- and meta-sternites, ocellar and gular areas, and most of upper portions of femora and tibiae. In darker-colored individuals: fulvous areas mentioned are brown with antero-lateral margins of prothorax nearly black; propodeum all black.

Male: Length 1.89; 2.00 mm. Similar to female except for the following differences of antennal, abdominal, and petiolar characters: Funicular segments 2–5 subequal in length and constricted at junctures, somewhat suggesting a pedicellate condition. Abdominal petiole punctate on upper surface, nearly as long as hind coxae (24:29). Remainder of abdomen twice the length of petiole; first two segments extending over entire abdomen; first tergite 1/3 longer than second, the hind margin entire.

Type Locality: Titusville, Pa. (Crawford County).

Types: Holotype, allotype, and one female paratype, Carnegie Museum. Two female paratypes and one male paratype, U. S. National Museum. One female paratype, Canada Department of Agriculture.

Remarks: This species is very similar to *C. cornigera* Westwood, a European species which I have not seen, but on which Gahan has published re-desciptive notes (Gahan, A. B., Proc. U. S. Nat. Mus. 96 (3203): 358–360. 1946). From *cornigera, dubarae* differs chiefly in the shorter ovipositor, in the lack of any sharp prominences on the facial carinae (fig. 1), and in less prominent tubercles on the clypeal margin. According to Dr. Burks, who compared a specimen of *dubarae* with the National Museum's series of *cornigera,* the latter species has the wings shaded less extensively, although with a similar pattern. From *C. aquila* Girault, *dubarae* may be distinguished by the smooth posterior half of the pronotum—*aquila* having the pronotum completely striated. The shorter abdominal petiole separates *dubarae* from *C. dinoderi* Gahan in which species the petiole exceeds the hind coxae in length.